Claims

1.   An automatic drawing creation method of constructing a
three-dimensional model by using a computer source having a
5   processing device source, a memory source, an input device and
an interface, in which

the processing device source executes a processing
including; a step of extracting a designated drawing frame
from a drawing frame data base that stores drawing frame data
10   on every application uses, a step of projecting a three-
dimensional model extracted from a three-dimensional model
data base on the extracted drawing frame thereby creating a
two-dimensional projection drawing, a step of extracting
dimensional line elements in accordance with the shape of the
15   two-dimensional projection drawing from a dimension data base
that stores data concerning a plurality of dimensional line
elements and deforming them in accordance with attribute
values of a product, and a step of compounding the deformed
dimension line elements and the two-dimensional projection
20   drawing and outputting the two-dimensional projection drawing
as a drawing, based on the operation program of the memory
source.

2.   The automatic drawing creation method according to
25   claim 1, the method including a step of extracting designated

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tolerance values and remarks from a design reference data base and describing them at designated positions on the two-dimensional projection drawing when the deformed dimension line elements and the two-dimensional projection drawing are

5   compounded.

3.   An automatic drawing creation system including an attribute value data base that stores data concerning the attribute values of a product, a three-dimensional model data

10 base that stores three-dimensional model data of the product, a drawing frame data base that stores drawing frame data on every application uses, projection drawing creation means that extracts the designated drawing frame from the drawing frame data base, and projects the three-dimensional model extracted

15 from the three dimensional model data base on the extracted drawing frame thereby creating a two-dimensional projection drawing, a dimension data base that stores data concerning a plurality of dimension line elements, compounding means that extracts the dimension line elements in accordance with the

20 shape of the two-dimensional projection drawing from the dimension data base, deforms them in accordance with the attribute values of the product and compounds the deformed dimensional line elements and the two-dimensional projection drawing, and drawing output means that outputs the two-

25 dimensional projection drawing compound by the compounding

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means as a drawing.

4.   The automatic drawing creation system according to claim 3, wherein

the system includes a design reference data base that stores data of tolerance values concerning each of the dimension line elements and remarks, and

the compounding means extracts designated tolerance values and remarks from the design reference data base and describes them at designated positions on the two-dimensional projection drawing when the deformed dimension line elements and the two-dimensional projection drawing are compounded.

5.   An automatic drawing creation program containing a program for causing a computer to execute a processing attained with each of the means according to any one of claims 3 and 4.

6.   A computer-readable memory medium that stores the automatic drawing creation program according to claim 5.

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